## REMARKS

Favorable reconsideration of this application is respectfully requested in view of the following remarks.

By way of this Amendment, new Claims 21-24 are added. Thus, the claims currently pending in this applications are Claims 1-19 and 21-24. Claims 1, 8, 12 and 18 are the only independent claims.

Independent Claims 1, 8 and 18 define an indwelling stent, while independent Claim 12 defines a living organ dilator comprising an indwelling stent. Each of the independent claims defines that the stent comprises annular units arranged in an axial direction of the stent, with each annular unit comprising a plurality of annular elements arranged to surround the stent access, and with adjacent portions of the annular elements in each annular unit being joined to each other through a joint. As recited in each of the independent claims, the joints in each of the annular units are substantially parallel to the stent axis. In addition, independent Claims 1, 8 and 12 recite that adjacent annular units are interconnected at the joints by at least one link, while independent Claim 18 recites that at least one link is connected to one of the joints connecting adjacent annular elements in one annular unit and one of the joints connecting adjacent annular elements in an adjacent annular unit.

As discussed in the present application, the joining of adjacent portions of annular elements through respective joints that are substantially parallel to the stent axis, and the interconnection of adjacent annular units at the joints by the link(s) provides a number of advantages. In one respect, the stent can be compressed to such an extent that the stent can be made relatively small in diameter. In addition,

the links remain substantially unchanged upon expansion of the stent and so the overall length of the stent is not significantly changed upon expansion of the stent.

The Official Action sets forth a rejection of the independent claims based on the disclosure in U.S. Patent No. 6,896,695 to *Mueller et al.* in view of the disclosure in U.S. Patent no. 6,174,326 to *Kitaoka et al.* That rejection is respectfully traversed for at least the following reasons.

*Mueller et al.* discloses a stent comprised of a plurality of axially arranged tubular portions 8. Each of the tubular portions 8 is comprised of a number of cell-shaped elements 10. The axially adjacent tubular portions 8 are connected to one another by way of first connecting bars 20 that extend between the cell-shaped elements 10. In addition, the adjacent cell-shaped elements 10 forming each of the tubular portions 8 are connected to one another by way of S-shaped second connecting bars 14.

One way in which the stent recited in independents Claim 1, 8, 12 and 18 differs from the stent disclosed in *Mueller et al.* is that the claimed stent at issue involves the joints. As noted above, the claims recite that adjacent portions of the annular elements are joined to each other through a joint, and further recite that the joints in each annular unit are substantially parallel to the stent axis. This is clearly not the case with the second connecting bars 14 disclosed in *Mueller et al.* Indeed, *Mueller et al* specifically describes that the second connecting bars 14 are S-shaped as clearly illustrated in, for example, Fig. 1. At best, the S-shaped second connecting bars 14 might be said to be somewhat diagonally oriented relative to the stent axis, but are clearly not substantially parallel to the stent axis.

In addition, as recited in the independent claims at issue here, adjacent annular units are interconnected at the joints by at lease one link. In *Mueller et al.*, the adjacent tubular portions 8 (annular units) are interconnected by the second connecting bars 20 which extend between the cell-shaped elements 10 in axially adjacent tubular portions 8. Thus, the adjacent tubular portions are not interconnected at the second connecting bars 14 by way of the first connecting bars 20 as claimed.

By virtue of its construction, the stent disclosed in *Mueller et al.* suffers from the disadvantage that when the stent is expanded, the overall length of the stent is changed due to the shortening of the cell-shaped elements 10 which are connected to one another by the second connecting bars 20.

*Kitaoka et al.* discloses a stent that includes several axially arranged annular units, each comprised of a plurality of annular elements. The annular elements in each annular unit are connected by connecting members that extend generally parallel to the circumferential extent of the stent (i.e., perpendicular to the stent axis). In addition, the axially adjacent annular units are connected by connectors extending between the connecting members.

The Official Action observes that the disclosure in *Kitaoka et al.* provides a teaching to interconnect the second connecting members 14 of axially adjacent tubular portions 8 of *Mueller et al.'s* stent rather than interconnecting the cell-shaped elements 10 of axially adjacent tubular portions 8. However, such a position is contrary to the disclosure in *Mueller et al.* In this regard, in the middle of column 7, *Mueller et al.* describes that the first connecting bars 20 are specifically provided to connect the outwardly bulging end 12 of the cell-shaped element 10 of one tubular

portion 8 to the narrow end 22 of the cell-shaped element 10 in the adjacent tubular portion 8. This same arrangement is consistent throughout all of the variations of the stent disclosed in *Mueller et al.* In addition, *Mueller et al.* goes on to describe, in connection with the illustrations in Figs. 5 and 6, the reasons for this particular arrangement in which the first connecting bars 20 extend between the cell-shaped elements 10 rather than the second connecting bars 14.

In light of the disclosure in *Mueller et al.*, specifically *Mueller et al's* objective of directly connecting together the cell-shaped elements 10 of adjacent tubular portions 8, an ordinarily skilled artisan would not have been motivated to modify the stent disclosed in *Mueller et al.* so that the first connecting bars 20 extend between the second connecting bars 14 in adjacent tubular portions.

Further, *Kitaoka et al.* specifically discloses that the connectors extending between axially adjacent annular elements are connected to connecting members that are arranged perpendicular to the stent axis. Thus, *Kitaoka et al.* does not disclose or suggest adjacent portions of annular elements being joined to each other through respective joints that are substantially parallel to the stent axis, with adjacent annular units being interconnected at such joints by at least one link.

Further, even if one of ordinary skill in the art was somehow motivated to utilize the disclosure in *Kitaoka et al.* to modify *Muller et al.'s* stent so that the first connecting bars 20 extend between the second connecting bars 14, the result would still not be the stent recited in the independent claims of the present application. That is, as pointed out above, the independent claims in this application recite that the joints connecting adjacent portions of the annular elements in each annular unit

are substantially parallel to the stent axis. This is clearly not the case with the second connecting bars 14 disclosed in *Mueller et al.*

For at least the foregoing reasons, it is respectfully submitted that the subject matter recited in independent Claims 1, 8, 12 and 18 is patentably distinguishable over the a combination of the disclosures in *Mueller et al.* and *Kitaoka et al.* Accordingly, withdrawal of the rejection of record and allowance of this application are earnestly solicited.

New independent Claims 21-24 define that the link and the joints to which the link is connected are positioned in a straight line. Such an arrangement is shown in various ones of the drawing figures of this application such as Figs. 1-4. Quite clearly, this would not be case if one were somehow motivated to modify the stent disclosed in *Mueller et al.* based on the disclosure in *Kitaoka et al.*

For at least the reasons set forth above, withdrawal of the rejections of record and allowance of this application are earnestly solicited.

Should any questions arise in connection with this application or should the Examiner believe that a telephone conference with the undersigned would be helpful in resolving any remaining issues pertaining to this application the undersigned respectfully requests that he be contacted at the number indicated below.

Respectfully submitted,

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